Srivathsan S

Dublin, Ireland — srivaths311@gmail.com — (+353) 899 821 465 — vathzen.in 🗹 — Chennai, India

EDUCATION

Trinity College, Dublin, Dublin, Ireland

Masters in Physics - Quantum Technologies

Coursework: Quantum Information Science, Open Quantum Systems and Thermodynamics, Quantum Materials and Nanophotonics, Quantum Computation and Algorithms, Physical Implementations of Quantum Technology, Quantum Machine Learning, Introduction to Tensor Networks.

SASTRA University, Thanjavur, Tamilnadu, India

Jul 2016 - May 2020

Sep 2023 - Expected: Aug 2024

Bachelor of Technology - Information and Communication Technology

Coursework: Data Structures and Algorithms, Machine Learning, Artificial Intelligence, Cryptography, Theory of Computation, Data Mining, DBMS, Operating Systems, Networking.

EXPERIENCE

Tata Consultancy Services

Systems Engineer Nov 2020 - Jul 2023

Develop, Maintain and Upgrade legacy systems of client Kemper Insurance in BFSI Domain in the Unix and PL/SQL tech stack. Spearheaded and Initiated many projects to alleviate technology bottleneck by gaining the Contextual Master level in the domain.

Freezon Labs

Full Stack Developer

Jul 2020 - Oct 2020

Design and develop as part of a 2-man team an Invoice Processing Machine Learning pipeline in React and Flask called Finvoice. The Machine learning algorithm detected tables and text and classified it based on context which can be viewed in specially designed dashboard.

Tata Consultancy Services

Developer Intern

Jan 2020 - Apr 2020

Worked on developing a mobile application in Flutter Framework as part of a software suite. Also analysed on different ways of Unit and Integration testing a Flutter app and deployment to a CI/CD pipeline.

Poornaprajna Institute of Scientific Research

Student Intern

May 2019 - Jun 2019

Attended leactures by Prof. R.Srikant on Mathematical methods of Physics such as Vector Spaces, Partial Differential Equations; Fourier and Laplace transforms, Lagrangian and Hamiltonian Interpretations, Solving Schrodinger's Equation for various scenarios.

Synergita Systems

Developer Intern

Nov 2018 - Dec 2018

Learnt and researched the various methods of analysing data in Natural Language Processing. Designed and Implemented a program to automatically categorise company support tickets into various departments using LDA and Guided LDA.

PROJECTS

Master's Thesis - Trinity College Dublin*

Working on my Master's Research Thesis Topic titled "Evaluating the Distance from Quantum Objective States" where I research quantum discord measure from SBS states under Prof. Felix Binder as part of the Quantum Information Theory Group.

iGEM 2019 House of Toeholds ☑

Part of the college team that won Silver Medal in iGEM 2019, Boston. Developed the Project Website and Machine Learning Classifier for identifying optimal toehold switch design based on physical parameters towards detection of Cervical Cancer Markers.

SASTRA Mess App

Yum Sastra

Yum Sastra

Developed a Mobile App for ordering food in College Mess. Full stack development of the app includes a Golang backend, Postgres Database and Ionic Frontend.

Open Source Development

Github 🗹

Contributing and maintaining Open Source Projects on GitHub including my personal website and experimenting and learning with various Quantum SDKs such as Qiskit. Also contains the website and apps developed for various MSMEs on a freelance basis.

PUBLICATIONS

Detection and Prediction of Schizophrenia Using Magnetic Resonance Images and Deep Learning

S. Srivathsan, B. Sreenithi, J. Naren

Cognitive Informatics and Soft Computing. Advances in Intelligent Systems and Computing, vol 1040. Springer, Singapore.

Computer Aided System for Autism Spectrum Disorder Using Deep Learning Methods

K. Sairam, J. Naren, Dr. G. Vithya, S. Srivathsan

International Journal of Psychosocial Rehabilitation, Vol 23 Issue 1,2019.

Supporting Individuals with Autistic Spectrum Disorder with Various Technologies: A Review

J. Naren, Dr. G. Vithya, S. Srivathsan, Bharath Reddy

International Journal of Psychosocial Rehabilitation, Vol 23 Issue 1,2019.

SKILLS

- **Programming:** C++, Python, Go, Java, Julia*.
- Software: Git, Unix, Google Cloud Certification.
- Frameworks: Oracle, Postgres, ReactJS, Scipy, Qiskit.